



National Aeronautics and
Space Administration
Langley Research Center
Hampton, VA 23681-2199

Educational Product

Educators

Grades 3-5

EP-2004-04-09-LARC



The Tree House Detectives

2004-2005 Season

The NASA Science Files™ is an annual series of FREE, Emmy®-award-winning educational programs for grades 3-5 emphasizing research-, inquiry- and standards-based instruction; Problem-Based Learning (PBL); and scientific inquiry. Each program supports the national mathematics, science, and technology standards and has three components that include (1) a 60-minute television broadcast (2) an educator guide with activities; and (3) an interactive web site featuring a PBL activity that enables students to further explore topics presented in the broadcast.

Use the Power of Technology to Make the NASA Connection

Now, in addition to the broadcast, educator guide, and web activity, your students can participate in a FREE virtual field trip. This 45-minute, interactive videoconference connects them to the NASA experts featured in each new NASA SCI Files™ program, the latest research, exciting demonstrations, and more. See reverse side for a list of scheduled events. Don't miss this exciting opportunity to bring mathematics, science, and technology to life!!

This opportunity is offered as a part of NASA LIVE™. Students must have viewed the NASA SCI Files™ broadcast prior to participating. To register for an event and additional information, visit <http://live.larc.nasa.gov>.

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Register online at
<http://scifiles.larc.nasa.gov>
to receive a FREE PDF of the
educator guides and program
updates via email.

How can I get the television broadcast?

- 1 The NASA SCI Files™ programs air on PBS, NASA TV, and many Cable Access Channels.
- 2 The programs are up-linked in KU- and C-band satellite.
- 3 Programs can be viewed online at
<http://www.knowitall.org>
or <http://ali.apple.com>
- 4 Video copies of the broadcast can be purchased from NASA CORE,
<http://core.nasa.gov>
or call toll free,
1-866-776-CORE.

Visit the NASA SCI Files™ web site for more details about getting the television broadcast.

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Bianca

Free Classroom Mentors

The Society of Women Engineers provides classroom mentors to assist with the hands-on activities and to explain scientific concepts. For more information, visit the NASA SCI Files™ web site or e-mail kimlien.vu@swe.org.



Check the back for a list of programs in the
2004-2005 NASA SCI Files™ series.

1 The Case of the Great Space Exploration

Starts airing: Wednesday, September 22, 2004, 11:00 a.m.–12 Noon EDT

NASA LIVE™ Event: October 21, 2004

New discoveries by NASA and a new vision for space exploration create an excitement in the tree house as the detectives set off to learn what it will take to become a space explorer. Join them as they head to Space Camp and NASA to find out if they truly have the "right stuff."

Mathematics Standards: Numbers and Operations, Measurement, Data Analysis and Probability, Problem Solving, Communication
Science Standards: Science as Inquiry, Physical Science, Life Science, Earth and Space Science, Science and Technology, Science in Personal and Social Perspectives

ITEA Technology Standards: Nature of Technology, Technology and Society, Design, Abilities for a Technological World, The Designed World

2 The Case of the Galactic Vacation (R)

Starts airing: Wednesday, October 20, 2004, 11:00 a.m.–12 Noon EDT

The tree house detectives go galactic with their latest project as they learn how long it will take to travel to Mars and how the Moon affects the Earth. Come visit the largest radio telescope in the world and help look for intelligent life in the universe. Join the tree house detectives for an "out-of-this-world" vacation as they explore the future of space travel.

Mathematics Standards: Numbers and Operations, Algebra, Geometry, Measurement, Data Analysis and Probability, Problem Solving, Communication.

Science Standards: Science as Inquiry, Life Science, Earth and Space Science, Science and Technology

ITEA Technology Standards: Nature of Technology, Technology and Society, Design, The Designed World

3 The Case of the Ocean Odyssey

Starts airing: Wednesday, November 17, 2004, 11:00 a.m.–12 Noon EST

NASA LIVE™ Event: February 17, 2005

Floating tennis shoes and oil globs wash up on the beach to set the tree house detectives in motion to investigate a unique world under the sea. Join them as they dive into learning about ocean floor topography, currents, ocean zones, and more.

Mathematics Standards: Numbers and Operations, Measurement, Data Analysis and Probability, Problem Solving, Communication
Science Standards: Science as Inquiry, Physical Science, Earth and Space Science, Science and Technology, Science in Personal and Social Perspectives, History and Nature of Science

ITEA Technology Standards: Nature of Technology, Technology and Society, Design, Abilities for a Technological World, The Designed World

4 The Case of the Radical Ride (R)

Starts airing: Wed., December 15, 2004, 11:00 a.m.–12 Noon EST

The tree house detectives' latest project on alternative forms of transportation takes on new relevance when they get stuck in traffic. Join the crew as they learn about the engineering design process and the latest in aeronautic technology in their quest for hassle-free traveling.

Mathematics Standards: Numbers and Operations, Algebra, Geometry, Measurement, Data Analysis and Probability, Problem Solving, Communication

Science Standards: Science as Inquiry, Physical Science, Life Science, Earth and Space Science, Science and Technology, Science in Personal and Social Perspectives, History and Nature of Science

ITEA Technology Standards: Nature of Technology, Technology and Society, Abilities for a Technological World, The Designed World

5 The Case of the Disappearing Dirt (R)

Starts airing: Wednesday, January 19, 2005, 11:00 a.m.–12 Noon EST

Summer fun suffers a setback when the tree house detectives discover that their favorite spot on the beach is shrinking. The detectives dig in and learn all about weathering, erosion, and the rock cycle.

Mathematics Standards: Numbers and Operations, Measurement, Data Analysis and Probability, Problem Solving, Communication
Science Standards: Science as Inquiry, Physical Science, Earth and Space Science, Science and Technology

ITEA Technology Standards: Nature of Technology, Technology and Society, Abilities for a Technological World, The Designed World

6 The Case of Zany Animal Antics

Starts airing: Wednesday, February 16, 2005, 11:00 a.m.–12 Noon EST

NASA LIVE™ Event: March 17, 2005

Curious as to why the animals are behaving so differently, the detectives join forces with NASA and animal experts to discover the cause of the animals' zany antics. Come learn about the classification and life cycles of animals, migratory patterns, habitats, and much more.

Mathematics Standards: Numbers and Operations, Measurement, Data Analysis and Probability, Problem Solving, Communication
Science Standards: Science as Inquiry, Physical Science, Life Science, Earth and Space Science, Science and Technology

ITEA Technology Standards: Nature of Technology, Technology and Society, Design, Abilities for a Technological World, The Designed World

7 The Case of the Prize-Winning Plants (R)

Starts airing: Wednesday, March 16, 2005, 11:00 a.m.–12 Noon EST

Everyone's green thumb is put to the test as the tree house detectives attempt to grow award-winning plants for the upcoming fair. The tree house becomes a green house as the detectives experiment with soil, light, plant life cycles, and genetics.

Mathematics Standards: Numbers and Operations, Measurement, Data Analysis and Probability, Problem Solving, Communication
Science Standards: Science as Inquiry, Physical Science, Life Science, Earth and Space Science, Science and Technology

ITEA Technology Standards: Nature of Technology, Technology and Society, Abilities for a Technological World, The Designed World

8 The Case of the Wacky Water Cycle (R)

Starts airing: Wednesday, April 20, 2005, 11:00 a.m.–12 Noon EDT

The tree house detectives' efforts to raise money with a car wash dry up when the city is hit with water restrictions. The entire group learns all about the water cycle, the water table, global climates, and much more to get the project flowing again.

Mathematics Standards: Numbers and Operations, Measurement, Data Analysis and Probability, Problem Solving, Communication
Science Standards: Science as Inquiry, Earth and Space Science, Science and Technology, Science in Personal and Social Perspectives

ITEA Technology Standards: Nature of Technology, Technology and Society, Design, Abilities for a Technological World, The Designed World

9 The Case of the Technical Knockout

Starts airing: Wednesday May 18, 2005, 11:00 a.m.–12 Noon EDT

NASA LIVE™ Event: June 2, 2005

In today's world of high tech devices, the tree house detectives discover that technology has its flaws when everything electronic stops working. Eager to get to the bottom of this electronic blackout, the detectives follow the wind to the nearest star...the Sun.

Mathematics Standards: Numbers and Operations, Geometry, Measurement, Data Analysis and Probability, Problem Solving, Representation

Science Standards: Science as Inquiry, Physical Science, Life Science, Earth and Space Science, Science and Technology

ITEA Technology Standards: Nature of Technology, Technology and Society, Abilities for a Technological World, The Designed World



Inspiring the next generation of explorers as only NASA can.